



OPERATING INSTRUCTIONS

OmniSource® 3312V / Model BCR3312V

For NiMH, NiCd & Lead Acid Batteries

INTRODUCTION

Thank you for purchasing LENMAR's OmniSource 3312V. The model BCR3312V can charge almost any 4.8, 6, 7.2, 9.6, 10 or 12V Volt NiMH, NiCd or Lead Acid rechargeable battery, but is *not* compatible with Li-Ion batteries. When recharging NiCd type batteries, the BCR3312V will operate as an AC/DC Battery Charger and Reconditioner to help avoid developing memory in your battery.

This charger will operate from a standard household AC outlet, or on the road from a 12 Volt cigarette lighter socket. It is a complete, convenient system to charge and condition almost any of your rechargeable batteries.

Using the charger

Plug the unit into your selected power source

Choose the proper adapter for either 110V household current or 12VDC car cigarette lighter adapter. Plug the proper adapter into the power source and plug the connector at the other end of the cord into the charger unit.

Adjust the contacts for your battery

The contacts on the charger must be properly adjusted to line up with the contacts on the battery before charging can take place. You must align the two contacts on the charger to the two contacts on the battery marked "+" and "-". There may be additional contacts on some batteries, which must not be connected to. Only connect to the "+" and "-" contacts on any battery. Connecting to the wrong contacts may damage the battery and/or the charger.

Reversed polarity

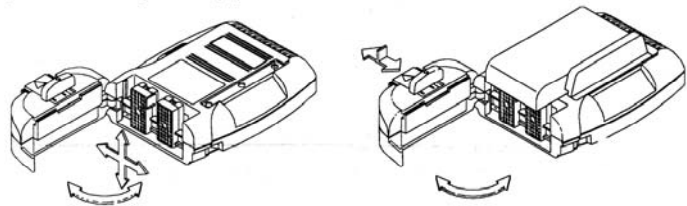
Once the battery is placed on the charger, the charger should emit a short beep and begin charging the battery. If the charger beeps continuously, the polarity to the battery is reversed. To remedy this, slide the switch (labeled S) on the side of the charger to the opposite side. The beeping will stop and the charging will begin.

The temperature sensor

The temperature sensor is important for the safe charging of your battery, so be sure it is attached to the battery whenever you are charging. Failure to do so could result in overheating and permanent damage to the battery. The sensor is magnetized and will stick to all battery types except Lead Acid. The sensor may be left off for this type of battery without harm.

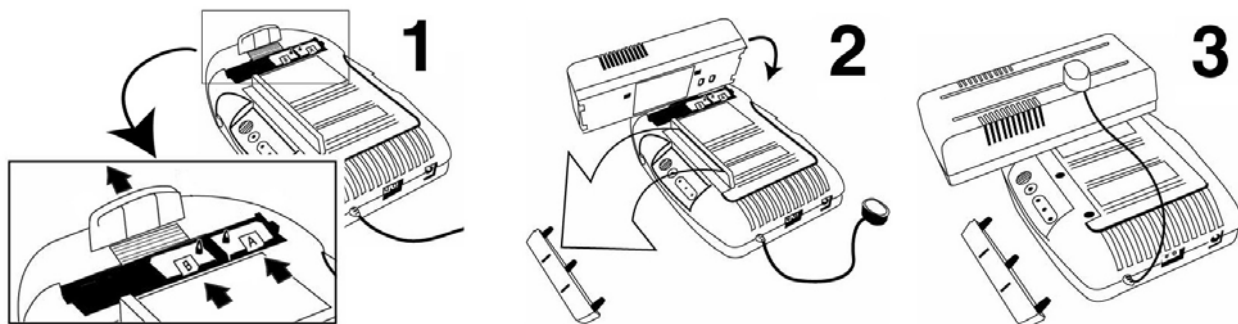
If the battery has Bottom contacts

Open the hinged jaw on the charger to unlock the moveable contacts. Hold the battery over the charger so you can see both the battery contacts and the charger contacts at the same time. Move the charger contacts sideways to set them at the proper distance from each other to match the contacts on the battery. Set the battery down onto the contacts to test they are in the correct position. The correct setup allows the battery to rest against the long fence (marked "D") and connect with the charger contacts. This allows for easier alignment of the battery to the charger. For large batteries or in some circumstances, the "D" fence may need to be reversed or removed to make more room for the battery. The same is true for the smaller "C" fence. When you are satisfied with the contact locations, close and latch the hinged jaw to lock the charger contacts into place. Set the battery down on top of the charger and make sure the charger contacts connect with the battery. Place the magnetic temperature sensor on top of the battery being charged.



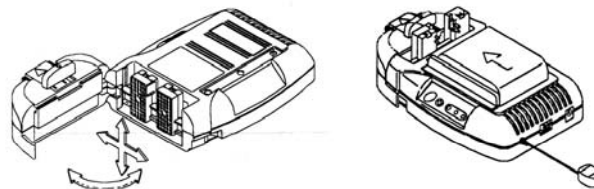
Special Instructions For Charging Sharp BT-30N Or Lenmar SBT30 Type Battery:

As shown in *diagram 1*, open the hinged jaw on the charger to unlock the moveable contacts and move contact "A" as far to the right as it will go. Position contact "B" so that it is 3/8 inches left from the tip of "A". Close and lock the hinged jaw. Slide Guide "C" out so that it hangs over the end of the charger by 1/2 inch. As shown in *diagram 2*, remove the guide fence "D". To place the battery onto the charger, hold as shown and align the contacts on the battery to the contacts on the charger, and lay the battery flat on top of the charger. The charger should emit a short beep and begin charging. If it makes a long continuous beep, see section titled "*Reversed Polarity*" above. As shown in *diagram 3*, place the magnetic temperature sensor on top of the battery (optional).



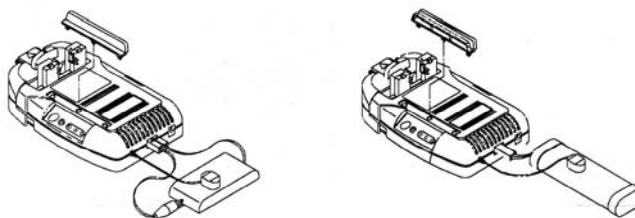
If the battery has End or Side contacts

Open the hinged jaw on the charger to unlock the moveable contacts. Pull up on the charger contacts to raise them above the top deck of the charger and expose the side facing contacts. Set the battery to be charged on the deck of the charger and against the fence (marked "D") with its contacts facing the charger's contacts. For large batteries or in some circumstances, the "D" fence may need to be reversed or removed to make more room for the battery. The same is true for the smaller "C" fence. Adjust the charger contacts up, down, left or right to line up with the contacts on the battery properly. When you are satisfied with the contact locations, close and latch the hinged jaw to lock the charger contacts into place. Set the battery down on top of the charger and slide the battery forward against the charger contacts to make good connection with the battery. Place the magnetic temperature sensor on top of the battery being charged.



Connecting to other batteries

Many rechargeable hobby batteries used for R/C (remote control) toys can plug directly into the charger on the end of the charger next to the power input connector. This is a standard connector and will fit many makes and types of hobby battery packs. For all other battery types, the optional clip lead will be required. Plug the connector end of the clip leads into the charger base at the end next to the power input connector. Use the alligator clips onto the exposed contacts on the battery to be charged. Be careful not to crush or deform spring contacts made of bent sheet metal. Place the magnetic temperature sensor on top of the battery being charged.



The charge status display

Once the charger unit has beeped to verify the battery is making proper contact, the charge indicator on the side of the unit will show the progress of the charge.

Charge Status Display	Indicators (● = off, ○ = on)	Charge Level
Yellow LED only (Flashing)	○ ● ●	0-33%
Yellow + 1 Red LED	○ ○ ●	33-66%
Yellow + 2 Red LED's	○ ○ ○	66-99%
Red LED only	● ● ○	Full / Complete

The charger will automatically stop the charge and beep when a full charge is detected on the battery. The charge indicator will show only 1 Red light to indicate the battery has reached full charge. The time required to reach a full charge will vary depending on the capacity of the battery and how much charge is already in it before you start.

Reconditioning (for Ni-Cd type batteries only)

NiCd batteries are prone to developing a "memory" if not occasionally fully discharged before they are recharged. No other types of batteries are subject to developing memory, so battery types other than NiCd should not be reconditioned. Make sure the unit is connected to power, and connect the NiCd battery to be reconditioned/recharged. Once the charger beeps to indicate that the battery is properly connected, briefly press the *Discharge* button on the front of the unit. The unit will beep 2 times and the green *DISCHARGE* light will go on. The *DISCHARGE* light will stay on until the battery is fully discharged, then the charger will switch automatically into the charge mode and charge the battery fully. Depending on the capacity of the battery and the amount of charge present, the discharge cycle could take many hours to complete.

NOTE: You should only use the *Discharge* feature with a Ni-Cd type battery. Discharging other type batteries may cause damage to the battery's ability to accept a full charge in the future.

Battery Compatibility

This charger will charge virtually any NiMH, NiCd, or Lead Acid battery, but is ideally suited for use with the following Lenmar batteries: CBE22, DMC50, MB72S, OBC84S, PV20, SBT30, SBT73, SG683

Limited 3 Year Warranty

This limited warranty starts from the date of original purchase and expires 3 years thereafter.

If any part, because of manufacturing defects or workmanship fails to function properly under normal use will be repaired at no charge for parts and labor or, at our option, the product will be replaced. The following is excluded: damages from delay or loss of use of equipment, or damaged batteries, malfunctions resulting from misuse, tampering, unauthorized repairs, modifications, or accident.

Package the unit and its accessories carefully using ample padding material to prevent damage in transit and ship it prepaid and insured to:

LENMAR ENTERPRISES INC. USA , 4035 Via Pescador, Camarillo, CA. 93012.

When sending in product for service, your package should include evidence of date and place of purchase. Enclose \$10.00 for shipping and handling for addresses in the U.S. For outside the U.S. and Canada, freight will vary depending upon ship to address.

The following statement is required in the state of California pursuant to the settlement of an action brought by the Mateel Environmental Justice Foundation against multiple electronics and appliance manufacturers

WARNING: Handling the cord on this product will expose you to lead, a chemical known to the state of California to cause birth defects or other reproductive harm. **Wash hands after handling.**

